

In the Claims:

Please cancel claims 1, 2, and 6-10 without prejudice.

1 - 10. (Canceled)

11. (Previously Presented) A method for treating a human recipient for promoting muscle tissue growth, comprising:

treating a human recipient in need of muscle tissue growth by administering, by infusion or direct injection, a therapeutically effective amount of allogeneic mesenchymal stem cells to said human recipient, wherein said allogeneic mesenchymal stem cells are obtained from a human donor and wherein a step of MHC matching of said human donor to the recipient is not employed prior to the administration of said allogeneic mesenchymal stem cells to said human recipient.

12. (Previously Presented) The method of claim 11, wherein the allogeneic human mesenchymal stem cells are recovered from human bone marrow and are administered to the human recipient in a cell preparation that is substantially free of blood cells.

13. (Previously Presented) The method of claim 12, wherein the cell preparation is administered in conjunction with a carrier for the cell preparation.

14. (Previously Presented) The method of claim 13, wherein the preparation is administered systemically.

15. (Previously Presented) The method of claim 13, wherein the preparation is allogeneic mesenchymal stem cells are administered intravenously.

16. (Previously Presented) The method of claim 11, wherein the allogeneic human mesenchymal stem cells express incorporated genetic material of interest.

17. (Previously Presented) A method of promoting connective tissue implantation in a recipient mammal comprising the steps of adhering allogeneic mesenchymal stem or progenitor cells onto the connective tissue surface of a prosthetic device and implanting into the recipient mammal the prosthetic device containing these mesenchymal cells under conditions suitable for differentiating the stem cells into the type of connective tissue needed for implantation and wherein said allogeneic mesenchymal stem or progenitor cells are obtained from a mammalian donor and wherein a step of MHC matching of said mammalian donor to a recipient is not employed prior to the administration of said allogeneic mesenchymal stem cells to a mammalian recipient.

18. (Previously Presented) The method of claim 17, wherein said recipient mammal is a human patient.

19. (Previously Presented) The method of claim 17, wherein said mesenchymal stem cells are human mesenchymal stem cells.

20. (Previously Presented) The method of claim 11 wherein said direct injection is direct injection into said muscle tissue.